

THE AUSTRALIAN HEARD ISLAND & McDONALD ISLANDS PATAGONIAN TOOTHFISH FISHERY

2013

Annual Surveillance

Certificate Number: F-SCS-0083



July 2013

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General Information

Date of Issue	July 2013	
Prepared by	SCS SCS	Sabine Daume, Ph.D. Alexander Morison
Certification Date	16 March 2012	
Certification Expiration Date	15 March 2017	
Surveillance Team	SCS SCS	Sabine Daume Ph.D. (lead) Alexander (original assessment team)
Surveillance Stage	1 st Annual Surveillance	
Surveillance Frequency	Normal surveillance	
Methodologies	MSC Accreditation Manual Issue 5.1, MSC Fisheries Certification Requirements Version 1.3, 2013 MSC Guidance to Certification Requirements Version 1.3	

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List of Abbreviations

B _{MSY}	Biomass calculated for Maximum Sustainable Yield
CR	Certification Requirements (v1.3)
DAT	Default Assessment Tree
ETP	Endangered, Threatened or Protected
F _{LIM}	Fishing Mortality Limit Reference Point
IFMP	Integrated Fisheries Management Plan
ISO	International Standard Organization
MSC	Marine Stewardship Council
P1, P2, P3	The three guiding Principles of the MSC
PI	Performance Indicator
SCS	SCS Global Services
SSB	Spawning Stock Biomass
TAC	Total Allowable Catch
ULR	Upper Limit Reference Point

Executive Summary

This report summarizes the information and findings from the 1st annual surveillance including the required progress for closing out conditions for continued certification. This report also includes the client action plans for each condition with associated timelines.

This fishery was assessed using the MSC developed default assessment tree. The surveillance audit for 2013 utilized the MSC Certification Requirements and Guidance to Certification Requirements (v1.3). The surveillance audit was conducted by SCS lead auditor Dr. Sabine Daume and Mr. Alexander Morison both members of the original assessment. The surveillance meetings took place at the CSIRO Hobart, Australia on 20 and 21st June 2013.

SCS finds that the HIMI Patagonian toothfish fishery continues to meet the standards of the MSC and complies with the 'Requirements for Continued Certification.' Significant progress on the quantitative spatial analysis of habitat impacts was made since the assessment of the fishery. The FRDC project has been finalized, the draft report was submitted for peer review and is scheduled to be publically available in August. These relate to Performance Indicator 2.4.3. However since the report is not public and the results will be included into the risk assessment for this fishery, the condition remains open. All other conditions are also judged to be on target and remain open. Progress toward closing the remaining conditions will be evaluated at the 2014 surveillance audit

Table 1. Summary of Performance Indicators with conditions.

<i>Performance Indicator</i>	<i>Status of Condition/ Non-Conformance</i>
1.2.1	On target
1.2.2	On target
1.2.4	On target
2.4.3	On target
3.1.2	On target

MSC Certification and Conditions for Continued Compliance

An MSC certificate is valid for a period of 5-years. During the initial certification, five conditions were identified (see final report on MSC website¹). Conditions must be closed-out before the end of the certification period in March 2017.

Each of the conditions to certification was addressed with the client action plan. The action plan includes the actions to be undertaken, responsible parties and timeframe for meeting

¹ Available at: <http://www.msc.org/track-a-fishery/>

milestone goals. During this and each surveillance audit, the audit team will check progress against these milestones. The surveillance team will also “spot check” other performance indicators (PIs) from the original assessment to verify that the fishery is still in compliance with the MSC requirements. Results from the audit are published in the form of a report to the MSC website 30 days after the onsite visit. The client group has an opportunity to review the report and respond before publication.

The audit team evaluates progress toward closing conditions as “ahead of target”, “on target,” or “behind target.” This is based on whether there is enough evidence that sufficient progress is being made relative to the client action plan timeframe for milestones. If a “spot check” of PIs reveals that a PI no longer meets all scoring elements of the Scoring Guidepost 80 (SG80), an additional “condition” will be raised that must be addressed within the life of the certificate. In this surveillance audit, no deficiencies were evident and no new conditions are raised.

Consequences for Non-Compliance

Where a fishery is determined to be “behind target” for a condition, the surveillance team will work with the client representatives to determine a new timeframe for closing of the condition within the original certification period and will include interim milestones for completion. The client must provide evidence that the fishery is working toward compliance and identify the reason that the condition timelines are not met.

Depending on the severity of the non-compliance identified, a “minor” or “major” non-compliance may be raised. If a minor non-compliance is raised and then not addressed by the new timeframe, it will be elevated to a “major.” A major non-compliance must be addressed immediately.

SCS reserves the right to enact 7.4. of the MSC Certification Requirements where a fishery certificate may be revoked or suspended if a condition is not back “on target” within 12 months of falling “behind target” following the MSC certification requirements 27.22.9.

Surveillance Audit timing and Frequency

Surveillance audits including this audit were determined to take place annually with an onsite visit each year (normal surveillance cycle). After closing out Condition 1 and 2 and rescoring the PI, the surveillance level was re-determined following Table C3 and C4 of the certification requirements v 1.3. The fishery remains with a normal annual surveillance cycle that requires an onsite visit. This was communicated to the client at the closing meeting.

Stakeholder announcements and submissions

According to CR 27.22.4.3 stakeholders were informed about the time, place and scope of the surveillance audit, the surveillance team as well as the surveillance level for this fishery. No stakeholder submissions were received and stakeholders did not attend the onsite meeting.

Methodology

The surveillance audit was carried out in accordance with the Marine Stewardship Council (MSC) Certification Requirements v1.3. If a fishery fails the surveillance audit, and cannot address identified deficiencies in a reasonable period of time, then the use of the certificate and the MSC logo will be revoked by the certifier.

The issues for the certifier are whether the fishery has sufficiently acted on the required conditions set forth in the original certification report, and whether a random check on the performance of the fishery verifies continued compliance with the MSC standards.

The annual surveillance audit process is comprised of four general parts:

1. The certification assessment body (CAB) provides questions around areas of inquiry to determine if the fishery is maintaining the level of management observed during the original certification. In addition, the surveillance team requires that the client provide evidence that the fishery management system has taken the necessary actions to meet all conditions placed on the fishery during the initial certification assessment or any previous surveillance audits.
2. The surveillance/assessment team meets with the client fishery to allow the client to present the information gathered to answer the questions asked by the surveillance team. The surveillance team can then ask questions about the information provided to ensure its full understanding of how well the fishery management system is functioning and if the fishery management system is continuing to meet the MSC standards.
3. The surveillance team presents its findings to the client fishery at the end of the site visit. The results outline the assessment team's understanding of the information presented and its conclusion regarding the fishery management system's continued compliance with MSC standards. Where indicated, the surveillance team may provide the client fishery with additional time to supplement the information provided if the surveillance team finds that there are still issues requiring clarification.
4. Where appropriate, the client fishery submits final information to the surveillance/assessment team for consideration in the surveillance findings and report. The surveillance team then reviews the final information and submits a final report to the client fishery and the MSC for posting on the MSC website. If there are continued compliance concerns, these are presented as non-conformances that require further action and audits as specified in the surveillance report.
5. Attempts were made to harmonize the proposed scores of the PCDR of the overlapping SARPC fishery assessment ([see PCDR report of SARPC](#)). The scores for the HIMI toothfish fishery are based on the view that there is a single stock on the Kerguelen Plateau that is also fished by French vessels operating in the French EEZ around Kerguelen Island under French management.

The PCDR report of SARPC, however, takes the view that the two fisheries target different populations that form part of a broader meta-population and that the assumption of separate populations is a more conservative approach than assuming some level of mixing or a single population. According to the MSC guidelines (CR v 1.3, MSC 2013), Principle 1 applies to the whole of the fish stock(s) exploited by the fishery seeking certification. Therefore the French fishery and management system needs to be considered under PI 1.1.1 -1.2.4 and PIs 3.1-3.4. Agreement was reached and scores adjusted for the SARPC fishery based on the scores for the HIMI fishery for PIs 1.2.2 and 1.2.4; however agreement could not be reached on 1.2.1. The HIMI fishery was originally scored at 75 on the basis that there was a lack of clear evidence for a harvest strategy for the French fishery. The team members are aware that the SARPC fishery operates under a TAC (as does the Australian fishery) but did not consider that this in itself was evidence of a harvest strategy as harvest control rules are not well defined. This situation is unchanged and there is no additional information that would justify a higher score. The assessment team of the SARPC fishery decided that a score of 80 was still justified. In addition the assessment team of the HIMI fishery does not agree with the score and rationale for 3.1.2 that was presented in the PCDR of the SARPC fishery and therefore keep the condition that was place on the HIMI fishery open at least until the scores of the French assessment are finalized.

Surveillance Team

In accordance with MSC methodology and guidance SCS chose team members with combined comparable and equivalent experience to the original assessment team. Both Dr. Sabine Daume and Mr. Alexander Morison were involved in the re-assessment of the fishery.

Team Leader:

Dr. Sabine Daume

Original Assessment Team:

Mr. Alexander Morison

Dr. Sabine Daume, SCS Global Services

Dr. Daume was on the original assessment team. She is responsible for leading SCS's Sustainable Seafood Certification program, which includes both fishery and chain of custody certification under the auspices of the Marine Stewardship Council (MSC), using the MSC methodology and standards. Dr. Daume has been involved and/ or led numerous pre and full assessments as well as surveillance audits. Dr. Daume is a marine biologist with special expertise in the biology and ecology of exploited marine resources. She has over 13 years professional experience working closely with the fishing and aquaculture industry in Australia. In her role as the Senior Research Scientist at the Department of Fisheries in Western Australia, she led research projects related to fishery and fisheries habitats of temperate and tropical invertebrate species. Dr. Daume is also a certified lead auditor under the International Standard Organization (ISO) 90011:2008 certification requirement.

Alexander “Sandy” Morison – Consultant , Morison Aquatic Sciences

Mr. Morison is a consultant specializing in fisheries and aquatic sciences. He has over 30 years experience in fishery science and assessment at state, national and international levels and has

held senior research positions for state and national organizations in Australia. He is currently chair of the Ecologically Related Species Working Group of the Commission for the Conservation of Southern Bluefin Tuna and is also contracted by the Australian Fisheries Management Authority to chair the South East Scalefish and Shark Fishery Resource Assessment Group and the Slope Fisheries Resource Assessment Group and is the Scientific Representative on the South East Fishery Management Advisory Committee. Sandy has experience with the assessment of invertebrate, chondrichthyan and teleost fisheries. These include commercial and recreational fisheries in freshwater, estuarine and marine habitats and fisheries operating in tropical, temperate and polar environments.

Mr. Morison has participated as part of a team undertaking MSC pre-assessments for several fisheries and has been the Principle 1 expert for the MSC certification or surveillance audits of assessments of the Heard Island and McDonald Islands (HIMI) Icefish fishery, the HIMI toothfish fishery, the Macquarie Island toothfish fishery, the Kyoto Danish Seine Fishery, the Western Australian Rock Lobster Fishery and the Lakes and Coorong Fishery. Issues of straddling stocks have been important for the toothfish fisheries and the Kyoto Danish Seine Fishery.

Mr Morison has been engaged by the Great Barrier Reef Marine Park Authority to assist with a consultative assessment of the ecological risks from Queensland's East Coast Trawl Fishery that looked at the full range of ecological components as well as a separate assessment of this fishery's vulnerability to climate change. He has particular expertise with fish age and growth and has been involved in the development and implementation of harvest strategies for several fisheries. He has over 20 publications in peer-reviewed scientific journals (8 as senior author), 8 book chapters, and over 100 project reports, technical reports, client reports and papers in workshop and conference proceedings.

Schedule for Meetings

The surveillance audit for 2013 comprised:

1. An Audit Plan was provided to the client, management and scientists before the meeting. The opening meeting with the client included an exchange of information relevant to the surveillance audit.
2. A meeting took place on the 20th and 21st June 2013 with the client representative Mr. Exel and Mr. Scott as well as scientists and managers of the fishery (Table 2). The discussions focused on the ongoing activities associated with the Conditions placed on the fishery.
3. Necessary documents were sent to SCS by the client prior and during the meetings.

Table 2: Meeting Attendees

Meeting Attendees	Role	Organization
Dr Sabine Daume	Lead Auditor	SCS
Alexander Morison	Auditor	

Martin Exel	Client Representative	Austral Pty Ltd
Les Scott	Client Representative	Australian Longline Pty Ltd
Dr Dirk Welsford	Stock Status and	AAD
Dr Malcolm Haddon	Harvest Strategy	CSIRO
Peter Neave	Management	AFMA (by phone)

MSC Blue Eco-Label and Chain-of-Custody

Traceability for chain-of-custody begins at the point of landing. The product may carry the MSC blue ecolabel if the processor or toothfish buyer has a valid MSC chain-of-custody certificate from an accredited Conformity Assessment Body (CAB) such as SCS. The certificate holders for this fishery have current logo licensing agreements with Marine Stewardship Council International (MSCI) for this fishery but for the related HIMI toothfish fishery which allows them to use the MSC blue eco-label on products originating from that fishery's Unit of Certification (UoC).

New Documentation received

AFMA (2013). *Status Report Heard Island and McDonald Islands Fishery*. Report to the Department of Sustainability, Environment, Water, Population and Communities.

AFMA (2013). Australian Sub-Antarctic Fisheries Bycatch and Discarding Workplan. 19pp.

Candy, S.G. 2011. Estimation of natural mortality using catch-at-age and aged mark-recapture data: a multi-cohort simulation study comparing estimation for a model based on the Baranov equation versus a new mortality equation. CCAMLR Science 18: 1-27.

Candy, S.G., D.C. Welsford, T. Lamb, J.J. Verdouw and J.J. Hutchins (2011), Estimation of natural mortality for the Patagonian toothfish at Heard and McDonald Islands using catch-at-age and aged mark-recapture data from the main trawl ground. CCAMLR Science, 18: 29-45.

CCAMLR (2012). Report of the thirty first Meeting of the Commission, Hobart, Australia, 23 October- 1 November 2012. Available at:
<http://www.ccamlr.org/en/ccamlr-xxxi>

CCAMLR (2012). Report of the Working Group on Fish Stock Assessment (Hobart, Australia, 8 to 19 October 2012). Available at:
<http://www.ccamlr.org/en/wg-fsa-12>

CCAMLR Scientific Observer Cruise Report (2012). Trip SC69- Southern Campion 23/03/2011 to 20/05/2011. pp23

Constable A.J., Welsford D., Ewing G.P., Hibberd T., and Kilpatrick R. (draft). Demersal fishing interactions with marine benthos in the Australian EEZ of the Southern Ocean: An assessment of the vulnerability of benthic habitats to impact by demersal gears. Draft Final Report FRDC Project 2006/042.

Nowarra GB and Lamb TD (2012). The annual random stratified trawl survey to estimate the abundance of *Dissostichus eleginoides* and *Champsocephalus gunnari* in the Heard Island region (Division 58.5.2) for 2012. WG-FSA-12/25.

Nowarra GB, Welsford, DC, Candy SG and Lamb TD (2012) Analysis of the by-catch of *Channichthys rhinoceratus* and *Lepidonotothen squamifrons* from the fisheries at Heard Island and the McDonald Islands (Division 58.5.2). WG-FSA-12/24.

Patterson H and Skirtun M. (2012) Heard Island and McDonald Islands Fishery. pp 356-365 In: Woodhams J, Vieira S and Stobutzki I (eds) 2012. Fishery Status Reports 2011. Australian Bureau of Agricultural and Resource Economics and Sciences, Canberra. 440 p.

Pyper, W (2013). Toothfish research spawns new understanding. Australian Antarctic Magazine Issue 24. 8-9.

Welsford, D.C., Mclvor, J., Candy, S.G., and Nowara, G.B. 2012. The spawning dynamics of Patagonian toothfish in the Australian EEZ at Heard Island and the McDonald Island and their importance to spawning activity across the Kerguelen Plateau, Australian Antarctic Division, Final Report to the Fisheries Research and Development Corporation, Project No. 2010/064.

Welsford D, Lamb T and Hay I (2012). Appendix 4. Antarctic Fisheries: Heard Island and McDonald Islands Patagonian toothfish and mackerel icefish fisheries. pp 29-40 In: Tuck G.N., Knuckey, I. and Klaer, N.L. (2013). Informing the review of the Commonwealth Policy on Fisheries Bycatch through assessing trends in bycatch of key Commonwealth fisheries. Fisheries Research and Development Corporation final report 2012/046. 240 pp.

Welsford D, Ewing GP, Constable AJ, Hibberd T, and Kilpatrick R (draft May 2013). Demersal fishing interactions with marine benthos in the Australian EEZ of the Southern Ocean: An assessment of the vulnerability of benthic habitats to impact by demersal gears. Draft Final Report FRDC Project 2006/042.

Ziegler, P (2012). Influence of the quality and quantity of data from a multi-year tagging program on bias and precision of biomass estimates from an integrated stock assessment – update. WG-FSA-12/18.

Summary of the Fishery

Principle 1: Stock status and Harvest control rules and tools

Catches of Patagonian toothfish have continued to remain within the determined total allowable catches (TACs) (Table 1). There has also been no evidence of IUU fishing since 2006/07.

The Random Stratified Trawl Survey (RSTS) continues to be undertaken to support estimates of Patagonian toothfish abundance and to collect data on population structure (Nowarra and Lamb 2012). The survey conducted in April 2012 informed the setting of the catch limit for the 2012/13 season. The catches of Patagonian toothfish for 2012 were twice those of 2011 and about one and a half times higher than the long-term average from 2006-2011 (10 t). The 2013 survey had been completed at the time of the audit but the results were not yet available.

A study of prospective spawning locations around HIMI indicated that the toothfish spawn on the slopes around HIMI predominantly to the northwest, west and south at 1500–1900 m depth between May and August (Welsford et al. 2012, Figure 1). Juvenile fish are usually restricted to waters less than 1000 m, while larger adult fish are encountered at depths of up to 2700 m. The study also showed that a substantial proportion of the mature female population may not spawn every year, possibly due to the relatively high cost of provisioning large quantities of large, yolky eggs. This is the strongest evidence yet obtained that spawning within the Australian EEZ makes an important contribution to the overall spawning output of the populations on the Kerguelen Plateau.

Natural mortality (M) for toothfish has been estimated outside the assessment model based on a new method using catch-at-age and aged mark-recapture data (Candy 2011, Candy et al. 2011). This was the first time that a realistic estimate of M has been obtained for this fishery, but the value estimated (0.15 y^{-1}) had a wide confidence interval (0.055 to 0.250 y^{-1}) and was close the value previously used in assessments (0.13 y^{-1}). There was no update to the assessment of Patagonian toothfish in 2012.

Patagonian toothfish in the HIMI fishery continue to be classified as not overfished and not subject to overfishing in the ABARES fishery status reports (Patterson and Skirtun 2012).

More information about the preliminary integrated assessment for the component of the stock targeted by the French fishery has become available since the assessment of this fishery in 2012, through the latest report of the CCAMLR Working Group on Fish Stock Assessment (CCAMLR 2012a). This assessment produced estimates of spawning stock biomass of between 0.62 and 0.72 of unfished levels. The Working Group identified a number of issues to be investigated to provide a more robust assessment but agreed that the assessment model could be used to provide management advice for the 2012/13 season.

More information also became available about the harvest strategy and harvest control rules used in the French fishery since the assessment of this fishery in 2012, through the recent MSC

PCDR report released by the CAB of the French fishery ([see PCDR report of SARPC](#)). This report indicated that there is a harvest control rule for this fishery 'in the sense that there is a TAC'. This report also provided the assessors' views about extent to which there needs to be harmonization between the management of the two fisheries. This is not the final report for this assessment but the views are nevertheless pertinent to the conditions already imposed on the HIMI fishery and have been considered in the assessment of progress towards meeting them.

In addition HIMI toothfish has been rated as 'Best Choice' under the Monterey Bay Aquarium Seafood Watch Program (see [Report and new rating Monterey Bay Aquarium Seafood Watch Program](#)).

Table 1. Fishing effort, catch limits and reported catches for Patagonian toothfish in CCAMLR Statistical Division 58.5.2 (CCAMLR 2012a).

Season	Regulated fishery						Estimated IUU catch (tonnes)	Total removals (tonnes)
	Reported effort (number of vessels)	Catch limit (tonnes)	Reported catch (tonnes)					
			Longline	Pot	Trawl	Total		
1990	-	-	0	0	1	1	0	1
1992	-	-	0	0	0	0	0	0
1993	-	-	0	0	0	0	0	0
1995	-	297	0	0	0	0	0	0
1996	-	297	0	0	0	0	0	0
1997	2	3800	0	0	1927	1927	7117	9044
1998	3	3700	0	0	3765	3765	4150	7915
1999	2	3690	0	0	3547	3547	427	3974
2000	2	3585	0	0	3566	3566	1154	4720
2001	2	2995	0	0	2980	2980	2004	4984
2002	2	2815	0	0	2756	2756	3489	6245
2003	3	2879	270	0	2574	2844	1274	4118
2004	3	2873	567	0	2296	2864	531	3395
2005	3	2787	621	0	2122	2744	265	3009
2006	3	2584	659	68	1801	2528	74	2602
2007	2	2427	601	0	1787	2387	0	2387
2008	3	2500	835	0	1445	2280	0	2280
2009	3	2500	1168	10	1287	2464	0	2464
2010	4	2550	1213	30	1215	2459	0	2459
2011	3	2550	1383	34	1148	2564	0	2564
2012*	3	2730	1165	0	770	1935	-	1935

* Fishing season ends 30 November.

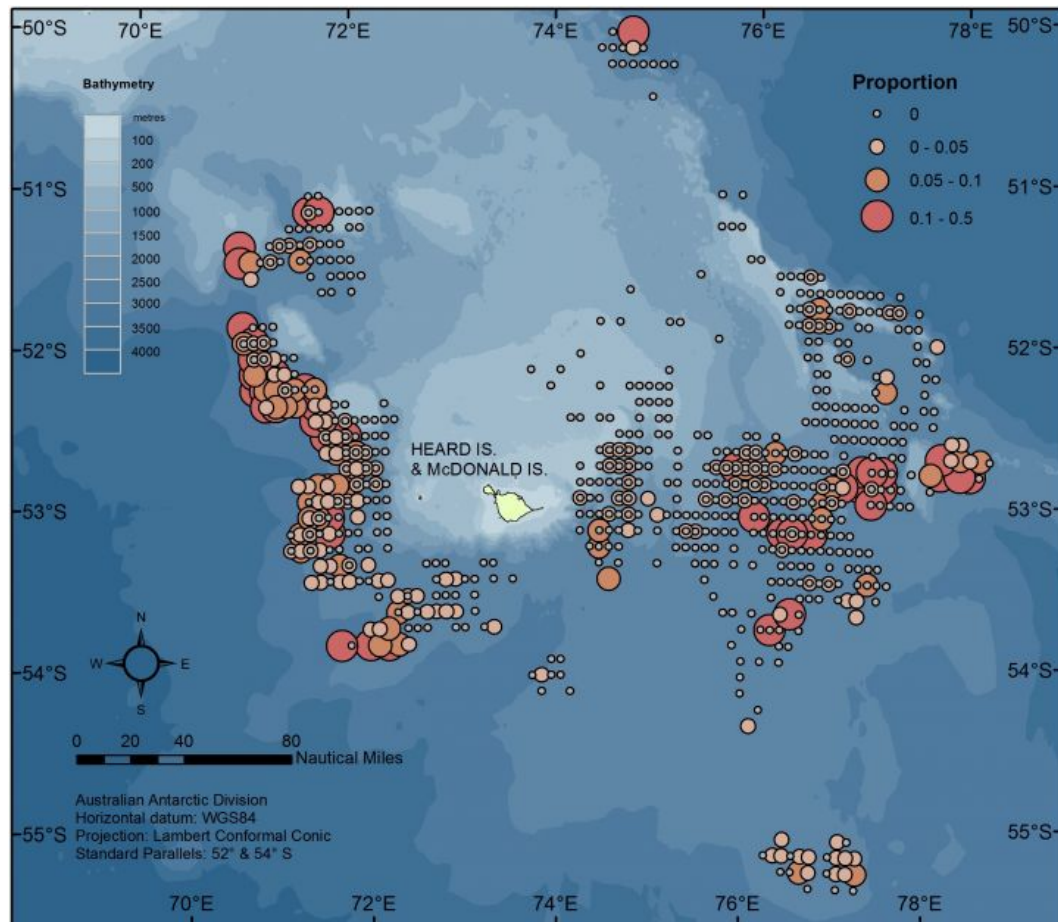


Figure 1. Location of spawning of female Patagonian toothfish as the proportion of females with gonads assessed as mature or in the process of maturing. Males showed a similar spawning pattern (From Welsford et al. 2012).

Principle 2: Ecosystem Impacts from Fishing

There have been no changes in the ecosystem impacts of the fishery since the certification in 2012. The TAC set for 2012 were slightly larger than for 2011 (Table 1) and total catch has remained within the TAC. It is not likely that the slightly higher TAC will have any adverse effect on the impacts of the fishery on, or the status of, retained species, bycatch, ETP species, or trophic function.

An updated Bycatch and Discard Workplan has now been produced (AFMA 2013c). As part of a review of the Australian Bycatch Policy there has also been a review of trends in bycatch across all Australian fisheries. This review included the HIMI fisheries (Welsford et al. 2013). It reported that fish bycatch in the HIMI fisheries has generally remained low and steady (although an increase in unicorn icefish and grey rock cod bycatch has been observed in the trawl fisheries in recent years that may be due to an increased abundance of these species) and that since the introduction of a closed season for midwater trawling in 2004 no bird bycatch has occurred in that fishery.

One condition was placed on the fishery during the assessment under Principle 2 in 2012 and related to PI 2.4.3. Strong progress has been made towards addressing this condition.

The habitat impact studies (condition 2.4.3) have been finalized and the full report in draft form has been sent out to peer review (Welsford et al. Draft May 2013). However results of that work are not yet publically available and the results will be incorporated into the risk assessment for this fishery. The study found that, unless the current peer review identifies flaws in the project's analytical methods (which is very unlikely at this stage), there is an extremely low level of impact from the fishery on the marine habitats.

Kerguelen Plateau, on which HIMI is situated, is unique due to its size and position. The results from the Welsford et al. study suggest degrees of mixing of some groups and restricted distributions of others including degrees of endemism in some groups. There were also clear disparities between geographic areas and geological regions, with some taxa restricted to only one region possibly by substrate (i.e. plateau or bank substratum) or oceanographic conditions (i.e. productivity). Those 'locally rare' or 'site restricted' taxa (most of which are endemic) may be particularly vulnerable to impacts from perturbation at the scale of the geographical areas sampled in this study due to limited distributions and abundances.

Principle 3: Governance and policy

The audit team noted the changes in the management arrangements for the fishery. The *Heard Island and McDonald Islands Fishery Management Plan 2002* was amended to remove the provision for a minimum quota holding in relation to non-trawl fishing methods, make provision for minimum quota holdings for trawl fishing methods through a Determination. There have been no amendments to the Management Plan since December 2011 although each year the conditions on Statutory Fishing Rights may be amended to reflect changes in Conservation Measures determined by CCAMLR (AFMA 2013a).

One condition was placed on the fishery during the assessment under Principle 3 and related to PI 3.1.2. More information about the French consultative process became available since the assessment of this fishery in 2012, through the recent MSC PCDR report released by the CAB of the French fishery.

The Préfet's (administrative head of the TAAF) decision in TAC setting is informed by a Consultative Council that brings together scientists and other resources persons nominated by the various ministries that meets twice a year. Local knowledge from the vessel skippers and fishing companies is taken into account, in the past in particular regarding activities of IUU vessels, which were successfully eliminated out of the fishery through close industry-government collaboration.

Information from SARPC is taken into account (logbooks, observer reports etc.) as part of the scientific assessment process, and the companies are also represented on the French delegation to CCAMLR every year. The PCDR reported that there are relatively few stakeholders in this fishery, because of its size and remote location. The assessment team of the French fishery concluded that most are involved in the management system in some way. The engagement of NGOs is facilitated via participation in CCAMLR and, for example, was mobilized

with the Australian and French industry associations and others in the region to fight against IUU activities.

The assessment team considered this information and determined that there is now a better understanding about the process. The client of the Australian fishery also worked closely with the French industry to participate in the recent review of the Monterey Bay Aquarium Seafood Watch Program.

The collaborations with the French scientists and managers have continued and significant progress has been made with regard to stock assessment of the French fishery. However the focus has been on the science at this stage and further cooperation will be required to develop compatible management goals, for containing fishing pressure on the whole stock at a level that will allow the common goals to be met. Therefore the team determined that the condition was on target but remained open until the next surveillance in 2014.

Progress toward closing conditions

1.2.1 There is a robust and precautionary harvest strategy in place.		
SG 60	SG 80	SG 100
<p>The harvest strategy is <u>expected</u> to achieve stock management objectives reflected in the target and limit reference points.</p> <p>The harvest strategy is <u>likely</u> to work based on prior experience or plausible argument.</p> <p><u>Monitoring</u> is in place that is expected to determine whether the harvest strategy is working.</p>	<p>The harvest strategy is responsive to the state of the stock and the elements of the harvest strategy <u>work together</u> towards achieving management objectives reflected in the target and limit reference points.</p> <p>The harvest strategy may not have been fully tested but monitoring is in place and <u>evidence</u> exists that it is achieving its objectives.</p>	<p>The harvest strategy is responsive to the state of the stock and is <u>designed</u> to achieve stock management objectives reflected in the target and limit reference points.</p> <p>The performance of the harvest strategy has been <u>fully evaluated</u> and evidence exists to show that it is achieving its objectives including being clearly able to maintain stocks at target levels.</p> <p>The harvest strategy is <u>periodically reviewed and improved</u> as necessary.</p>
Score: 75		
<p>Condition 1.2.1</p> <p>At the fourth annual surveillance audit, the client shall provide information to demonstrate that the harvest strategy is a robust and precautionary in place and evidence exists that it is achieving its objectives for all significant fisheries that target this stock and particularly for the fishery that operates within the French EEZ around Kerguelen Island.</p>		

Client Action Plan 1.2.1

How	By Whom	When completed
1. At each annual surveillance audit provide updates on progress by Australian and French fishery management agencies towards developing a robust and precautionary harvest strategy for the whole stock across the Kerguelen Plateau.	AAD AFMA Industry	Annually
2. By the 4th annual surveillance audit client will provide evidence of the robust and precautionary harvest strategy in place for the entire fishery, incorporating the French fishery.	Industry	March 2016

Progress on Condition

There has been progress towards this condition in the form of collaboration between Australian and French scientists that has assisted in developing an improved stock assessment for the French fishery and continues to progress the development of a joint plateau-wide stock assessment. The assessment of the French fishery was accepted by the CCAMLR Scientific Committee as being adequate for management advice for the 2012/13 fishing season.

Status of Condition:

On target

1.2.2 There are well defined and effective harvest control rules in place.		
SG 60	SG 80	SG 100
<u>Generally understood</u> harvest control rules are in place that are consistent with the harvest strategy and which act to reduce the exploitation rate as limit reference points are approached.	<u>Well defined</u> harvest control rules are in place that are consistent with the harvest strategy and ensure that the exploitation rate is reduced as limit reference points are approached.	The <u>design</u> of the harvest control rules take into account a <u>wide range</u> of uncertainties.

There is <u>some evidence</u> that tools used to implement harvest control rules are appropriate and effective in controlling exploitation.	The <u>selection</u> of the harvest control rules takes into account the <u>main</u> uncertainties. <u>Available evidence indicates</u> that the tools in use are appropriate and effective in achieving the exploitation levels required under the harvest control rules.	<u>Evidence clearly shows</u> that the tools in use are effective in achieving the exploitation levels required under the harvest control rules.
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Score: 70

Condition 1.2.2

By the fourth annual surveillance audit the client shall ensure that the harvest control rules take into account the main uncertainty in the assessment. This can be achieved once the stock assessment has been updated to incorporate the identified interactions between toothfish across the Kerguelen Plateau. The client shall provide evidence that the harvest control rule application will also explicitly account for the distribution of future catches of Patagonian toothfish in both the Australian and the French zones.

Client Action Plan 1.2.2

How	By Whom	When complete
1) Continued development of research and scientific programs on toothfish stock status and toothfish interchanges across the Kerguelen plateau	AAD	Annual
2) Development of alternative stock assessment approaches so that the application of the CCAMLR harvest strategy will take into account toothfish stock interchange across the Kerguelen Plateau, should this be shown to be significant, and if rapid implementation of joint international management arrangements are not feasible.	AAD	March 2015
3) Investigation of cooperative management arrangements with France for identified interactions on stock(s) across the Plateau.	AAD	March 2016

4) Research program completed on spawning stock definition for Australian side of the plateau	Industry/SARAG	March 2014
5) Joint research projects for cross boundary toothfish investigations such as tagging, annual stock survey approaches, and stock assessment methodologies.	SARAG/AAD	Annual, March 2014
<p>Progress on Condition</p> <p>Work on the location of spawning grounds for toothfish around HIMI and ongoing tagging work continue to improve knowledge of the linkages between toothfish found in Australian and French EEZs. This will assist in assessing the need for harvest control rules to explicitly account for catches in both EEZs and the value in employing a single plateau-wide stock assessment.</p>		

Status of Condition:

On target

1.2.4 There is an adequate assessment of the stock status.		
SG 60	SG 80	SG 100
The assessment estimates stock status relative to reference points.	The assessment is appropriate for the stock and for the harvest control rule, and is evaluating stock status relative to reference points.	The assessment is appropriate for the stock and for the harvest control rule and takes into account the major features relevant to the biology of the species and the nature of the fishery.
The major sources of uncertainty are identified.	The assessment takes uncertainty into account.	The assessment takes into account uncertainty and is evaluating stock status relative to reference points in a probabilistic way.
	The stock assessment is subject to peer review.	The assessment has been tested and shown to be robust. Alternative hypotheses and assessment approaches have been rigorously explored.
		The assessment has been <u>internally and externally</u> peer reviewed.

Score: 70

Condition 1.2.4

By the fourth annual surveillance audit the client shall ensure that the assessment is appropriate for the stock and specifically that it accounts for fishing impacts on the entire known range of the stock including the proportion found and fished in the French zone.

Client Action Plan 1.2.4

How	By Whom	When completed
Stock assessment for Kerguelen Plateau incorporating known interactions and extent of toothfish stock boundaries prepared by Australia.	AAD	March 2016

Progress on Condition

Progress as noted above

Status of Condition:

On target

2.4.3 Information is adequate to determine the risk posed to habitat types by the fishery and the effectiveness of the strategy to manage impacts on habitat types.

SG 60	SG 80	SG 100
<p>There is a basic understanding of the types and distribution of main habitats in the area of the fishery.</p> <p>Information is adequate to broadly understand the main impacts of gear use on the main habitats, including spatial extent of interaction.</p>	<p>The nature, distribution and vulnerability of all main habitat types in the fishery area are known at a level of detail relevant to the scale and intensity of the fishery.</p> <p>Sufficient data are available to allow the nature of the impacts of the fishery on habitat types to be identified and there is reliable information on the spatial extent, timing and location of use of the fishing gear.</p> <p>Sufficient data continue to be collected to detect any increase in risk to habitat (e.g. due to changes in the outcome indicator scores or the operation of the fishery or the effectiveness of the measures).</p>	<p>The distribution of habitat types is known over their range, with particular attention to the occurrence of vulnerable habitat types.</p> <p>Changes in habitat distributions over time are measured.</p> <p>The physical impacts of the gear on the habitat types have been quantified fully.</p>

Score: 70

Condition 2.4.3

By the first annual surveillance audit, the client shall provide some evidence that the nature of the impacts of the fishery on different habitat types is known and that monitoring is ongoing to detect any increase in risk. The client shall consider including the results of the ongoing study on habitat impacts in the region.

Client Action Plan		
How Meet	By Whom	When Completed
Results of benthic impacts study presented publicly.	AAD	March 2013
Incorporation of results in risk assessment program and in consideration of evaluation of existing Marine Protected Areas to ensure comprehensive, adequate and representative areas are set aside, and impacts on other regions are mitigated where feasible.	SARAG, SouthMAC, AFMA, AAD	March 2014
Progress on Condition <p>The habitat impact studies have been finalized and a copy of the draft final report to FRDC (Welsford et al. 2013) was provided to the audit team. This report is currently being independently reviewed prior to submission to FRDC. Final results of that work, however, are not publically available and this condition can therefore not be closed out as planned. The final report is expected by June 2014.</p> <p>The delays in submission of the final report were the result of changes to staff responsibilities during the past 12 months at AAD. The findings contained in the draft report that were presented to the audit team indicate that, unless the review identifies a hitherto unrecognized major flaw in the project's analytical methods, there is an extremely low level of impact from the fishery on the marine habitats. There is therefore also a low risk from the fishery continuing to operate under current arrangements. However there are plans to incorporate the results into the risk assessment program that includes this fishery and this condition is therefore planned to be closed out at the 2nd annual surveillance audit in 2014.</p> <p>Monitoring is ongoing as evident from the observer reports (CCAMLR 2012b).</p>		

Status of Condition:

Open, on target

3.1.2 The management system has effective consultation processes that are open to interested and affected parties.

The roles and responsibilities of organizations and individuals who are involved in the management process are clear and understood by all relevant parties.

SG 60	SG 80	SG 100
<p>Organizations and individuals involved in the management process have been identified.</p> <p>Functions, roles and responsibilities are <u>generally understood</u>.</p> <p>The management system includes consultation processes that <u>obtain relevant information</u> from the main affected parties, including local knowledge, to inform the management system.</p>	<p>Organizations and individuals involved in the management process have been identified. Functions, roles and responsibilities are <u>explicitly defined and well understood</u> for <u>key areas</u> of responsibility and interaction.</p> <p>The management system includes consultation processes that <u>regularly seek and accept</u> relevant information, including local knowledge. The management system demonstrates consideration of the information obtained.</p> <p>The consultation process <u>provides opportunity</u> for all interested and affected parties to be involved.</p>	<p>Organizations and individuals involved in the management process have been identified. Functions, roles and responsibilities are <u>explicitly defined and well understood</u> for <u>all areas</u> of responsibility and interaction.</p> <p>The management system includes consultation processes that <u>regularly seek and accept</u> relevant information, including local knowledge. The management system demonstrates consideration of the information and <u>explains how it is used or not used</u>.</p> <p>The consultation process <u>provides opportunity and encouragement</u> for all interested and affected parties to be involved, and <u>facilitates</u> their effective engagement.</p>

Score: 75

Condition 3.1.2:

More information about the French consultative process became available since the assessment of this fishery in 2012, through the recent MSC PCDR report released by the CAB of the French fishery. The additional information on consultation processes, contained in the PCDR, in the French component of the management system clarifies the nature and extent of the opportunities for all interested and affected parties to be involved.

Collaboration between the Australian and French scientists has continued and significant progress has been made with regard to stock assessment of the French fishery. However the focus has been on the science at this stage and further cooperation will be required between managers to develop compatible management goals, for containing fishing pressure on the whole stock at a level that will allow the common goals to be met. Therefore the team determined that the condition was on target but remained open until the next surveillance in 2014.

Client Action Plan

How Meet	By Whom	When Completed
Encouragement to organizers to ensure full opportunities for all interested and affected parties to be involved in national and international meetings.	Industry/ CCAMLR Consultative forum, SARAG, SouthMAC, AAD, AFMA Australian and French Governments	Ongoing, March 2015
Provide information on existing consultation processes in all management systems to demonstrate opportunity for all interested and affected parties to be involved.	Industry	March 2015

Progress on Condition:

More information about the French consultative process became available since the assessment of this fishery in 2012, through the recent MSC PCDR report released by the CAB of the French fishery.

The collaborations with the French scientist and managers have continued and significant progress has been made with regard to stock assessment of the French fishery. However the focus has been on the science at this stage and further cooperation will be required to develop compatible management goals, for containing fishing pressure on the whole stock at a level that will allow the common goals to be met. Therefore the team determined that the condition was on target but remained open until the next surveillance in 2014.

Status of Condition

On target

Results and Conclusions

It is SCS's view that the HIMI Toothfish fishery continues to meet the standards of the MSC and complies with the 'Requirements for Continued Certification.' In this audit cycle, all conditions were judged to be on target and remained open until the next surveillance audit. Progress toward closing these conditions will be evaluated at the 2014 surveillance audit.

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